Desi Ujkashevic, Global Director
Automotive Safety Office
Sustainability, Environment & Safety Engineering

Fairlane Plaza South, Suite 400
330 Town Center Drive
Dearborn, MI 48126-2738

January 24, 2019

Marlene H. Dortch
Secretary
Federal Communications Commission
445 12th Street SW
Washington, DC 20554

Dear Ms. Dortch:

RE: Petition for Waiver to allow Deployment of Cellular Vehicle –To-Everything (CV2X) Technology in the 5.9GHZ Band - Request for Comments
GN Docket No. 18-357

Ford Motor Company (Ford), a domestic manufacturer and importer of motor vehicles with offices at One American Road, Dearborn, Michigan 48126-2798, submits the following comments on the 5G Automotive Alliance (5GAA) Petition for Waiver to allow Deployment of Cellular Vehicle –To-Everything (CV2X) Technology in the 5.9GHZ Band - Request for Comments (RFC), dated December 6, 2018 (GN Docket No. 18-357). Ford participated in the development of the comments submitted by 5GAA, and thereby, incorporates by reference those comments in our response.

Ford not only supports the waiver but also believes that CV2X will be critical in bettering the roads and cities of the future for the following reasons:

1. CV2X could potentially deliver safety benefits like other V2X technologies, which the industry and the government have invested to develop for the benefit of its citizens. It could enable advance warning of various road conditions and vehicle actions, potentially improving both road and vehicle safety.
2. Vehicle connectivity to everything will provide a level of system visibility that could enable effective and efficient orchestration for better transportation-demand management. As such, it may encourage better journey optimization for both people and goods and help to improve traffic flow and minimize congestion, both in real-time and in providing data for simulation and planning purposes.
3. C-V2X will help unlock the full potential of self-driving technology by serving as an additional source of data about city infrastructure, traffic, construction, and emergency vehicles that will solve for some of the more challenging road interactions. For instance,

the technology could help identify an emergency vehicle and whether an AV needs to pull over or change route.

For these reasons, at the recent Consumer Electronics Show, Ford Motor Company announced its intention to deploy cellular vehicle-to-everything technology in all of our new vehicle models in the United States that we launch beginning in 2022.

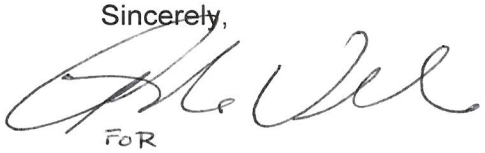
A conducive regulatory environment must be in place for C-V2X to be deployed. That is why we are working with both industry and government organizations to encourage widespread adoption. This technology will only live up to its full potential when substantive number vehicles in operation and their surrounding infrastructure are utilizing it. It is essential that automakers, infrastructure and road operators, as well as government agencies collaborate to help accelerate the deployment of C-V2X.

Further to the 5GAA's submission, we want provide additional emphasis on the following aspects of the Waiver to allow Deployment of Cellular Vehicle –To-Everything (CV2X) Technology:

- C-V2X On Board Units provided an additional improvement in Basic Safety Message reliability of reception in realistic road situations, which included non-line-of-sight radio conditions.
- Under the same interference conditions, resulting from the operation of Wi-Fi signals in the adjacent bands, C-V2X communication showed improved resiliency through higher reliability of packet reception as a function of distance.
- As a result of almost 100% new-vehicle penetration of cellular V2N-capable chipsets, the integrated C-V2X capability represents an incremental feature that can provide significant cost and complexity efficiencies
- C-V2X provides an improved radio interface with a minimal change to the V2X applications stack. As a result, we can leverage the many years of V2X research to deploy at an accelerated pace.
- By being part of a large ecosystem of today's 4G and tomorrow's 5G mobile devices and network infrastructure, C-V2X offers potential for improved functionality and reliability at reduced societal cost.
- C-V2X has a clear evolutionary path to 5G, which ensures future versions will remain functionally backwards compatible, while benefiting from future advancements in wireless technologies.

If you or your staff have any questions regarding these comments, please contact Nick Baracos (email: nbaracos@ford.com or phone: 313-248-2003).

Sincerely,



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Desi Ujkashevic

Attachment